# 202

# Universal Design for Learning and Inclusion in Higher Education - Group Work for Effective Learning with Diverse International Students in the UK

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### **Research Domains**

Postgraduate scholarship and practice (PGSP)

### **Abstract**

International students face many challenges transitioning to post-graduate study in UK institutions (Elliot and Makara 2021). A range of cultural practices and curricular norms must be adapted to, often without the differences between UK and their home countries being made explicit. Building on Vygotskian concepts of scaffolded learning (Bruner 1986) and the importance that group interaction (Wegner 1998) plays within learning, this research reports on an initiative to embed UDI principles in a group work approach to developing research skills within an International Masters in Education module using a case study design (Yin 2013) consisting of analysis of class artifacts, questionnaires and focus group. Survey and focus group data yielded congruent findings that students appreciated the UDL (CAST 2011) affordances of the group work activities and used a range of modalities to negotiate social and cultural diversity. In-class group work activities were preferred to group work on-line.

# **Full paper**

Introduction: International students face many challenges transitioning to post-graduate study in UK institutions (Elliot and Makara 2021, Thomas 2016). A range of cultural practices and curricular norms must be adapted to, often without the differences between UK and their home countries being made explicit. Building on Vygotskian concepts of scaffolded learning (Bruner 1986) and the importance that group interaction (Wegner 1998) plays within learning, this research reports on an initiative to embed UDL principles in a group work approach to developing research skills within an International Masters in Education module using a case study design (Yin 2013) consisting of analysis of class artifacts, questionnaires and focus group.

Universal Design for Learning (UDL) is an educational design framework based on Universal Design in architecture, neuroscience research, and latest advancement in digital technology. A UDL approach uses multiple means to represent learning materials, multiple means to check student learning progress, and multiple means to stimulate student engagement in learning (CAST 2018). The goal is to anticipate and meet diverse learner needs starting from the planning stage, instead of plastering on retrofitting adjustments for individual learners later on when additional needs are identified.

To achieve this in our study, firstly, the UDL principle of multiple means of engagement informs our learning design that consists of whole class tutorials, group work, and weekly independent study tasks. Group tasks each week of the module asked students to compare their exploration of successive steps of the research process. These diversified means of engagement are designed to stimulate interests as well as encourage autonomy among students. UDL principle of multiple means of action and expression was enacted through Moodle forum discussions, weekly group posters and verbal presentations of posters in class. Making and presenting posters following group discussions was used as a reflexive process that helped students to consolidate knowledge, check learning progress, and act on tutor feedback. It enabled students to demonstrate understanding and critical thinking outside the

conventional assessment method of academic essays. Thirdly, the UDL principle of multiple means of representation underpins the use of extended presentational, reading and video learning materials designed to be more interesting and accessible for students.

Emerging studies show that the UDL framework can be a viable and sustainable lens for educators to create inclusive learning environments for international students in higher education (Bracken & Novak 2019; Fovet 2020). Our research adds to this momentum by exploring how our UDL informed group work approach helped to improve learning experience and created student awareness and active problem-solving participation, enabling a more inclusive and effective intellectual and social environment for diverse international students.

# Research design:

We take an interpretivist perspective that stresses in-depth qualitative understanding of the particularity and is exploratory, open-ended, data-driven and inductive (Taber 2012). Qualitative analysis offered valuable insights into participants' lived experiences and unique perspectives (Corbin and Strauss, 2008). A case study approach provided "a means of understanding complex human situations and human encounters" (Simon 1996: 226). The focus of this study is on explanation through exploring the intricacies of social phenomena in open systems. This involves analysising how the UDL informed group work approach was understood by students and the active sense-making they did whilst engaging with it. Nine focus group participants and 11 survey respondents based on campuses in London and Scotland shared their views on group work experience and its effect on their developing understanding of international education. Thematic analysis was used to compare and refine themes across the two campus settings were fieldwork was conducted.

Findings: Survey and focus group data yielded congruent findings that students appreciated the UDL (CAST 2018) affordances of the group work activities. The three UDL principles of multiple choices learning materials, learning activities, and expression of learning outcomes played varying roles at the two campuses. In-class group work activities were preferred to group work on-line, with students

using a range of modalities to negotiate social and cultural diversity. An examination of group work posters and forum responses shows a growing capacity to compare and contrast perspectives and learn across different cultural perspectives.

Discussion: Students described using many different modalities, devices and software applications to work together. However, they highlighted that incorporating digital technologies into working together necessitated being spatially located together to learn digital literacy skills from each other and agree working practices, rather than eliminating a need for face-to-face interaction. This suggests further problematisation of digital literacies is needed. Students' narration of evolving understandings of international education and its interactional challenges and opportunities also requires further exploration.

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